Build of *R. zonaria*, Buq., but rather broader. Head and thorax bright fulvous yellow; the latter with a lateral tubercle rather behind the middle, the sides in front of this oblique. Elytra pale greenish white, tinted with yellow on the sides; each with six black spots, viz. one next the scutellum, a large oblique one just before the middle at the suture, another behind the middle a little removed from the suture, and three smaller spots on the humeral margins. The underside of the insect is greenish yellow, with a black spot on the side of the metasternum, and with the abdominal segments narrowly edged with black.

Hab. Antananarivo.

# LX.—Description of Ophites japonicus, a new Snake from Japan. By Dr. A. Günther, F.R.S. &c.

Scales in seventeen rows, those in the middle of the back so feebly keeled as to appear almost smooth. Ventrals 205; anal divided; subcaudals 69. Form of the head resembling that of Leptodeira annulata. Eye rather small, with vertical pupil. Anterior frontals short, rather broader than long; vertical as long as broad. Nostril in a large deep hollow. Loreal narrow, more than twice as long as deep, narrower behind than in front. No præocular; two postoculars; eight upper labials, the third, fourth, and fifth entering the orbit; the portion of the third which enters the orbit is very narrow and pointed. Temporals 2+3. Purplish grey, with numerous black cross bands, which on the anterior part of the trunk are subquadrangular, much broader than the interspaces, and subrhombic, and about as broad as the interspaces on the rest of the body. Lower parts whitish, clouded with black or marbled towards the middle of the belly.

Two specimens were obtained, by Mr. C. Maries, near Nikko in Central Japan. The larger is 26 inches long, of which

the tail takes 5 inches.

#### MISCELLANEOUS.

New Northern Gephyrea. By MM. D. C. Danielssen and J. Koren.

MM. Danielssen and Koren have described several new genera and species of Gephyrea obtained by the Norwegian North-sea expedition north of 63° N. lat. One species is described and illustrated in detail; it constitutes a new genus of the family Bonellide, named *Hamingia*, after the goddess of fortune in the northern mythology.

# Hamingia, g. n.

Body cylindrical; mouth at the anterior extremity, towards the ventral surface. Anal orifice in the centre of the posterior extremity. A slightly projecting crescentiform fold surrounds the mouth (rudiment of the proboscis). In the anterior part of the ventral surface there are two long cylindrical papillæ, at the apex of which there is a round aperture for the efferent duct of the uterus. No setæ.

The intestinal canal forms loops, but no spiral, and terminates in a cloaca, from each side of which springs a ramified glandular apparatus. Central nervous cord smooth, without ganglia. One ovary, which lies along the nervous cord in the posterior half of the body-cavity. Two uteri, with their efferent ducts and funnels.

Male unknown.

# Hamingia arctica, sp. n.

Body cylindrical, smooth, 120 millims. long, 20 millims. broad, assuming various forms under contraction. Colour lighter or darker grass-green, with yellowish-white buccal disk. The crooked papillæ on the ventral surface greenish, with yellowish-white extremities.

A single example, taken at Station 290, in 72° 27′ N. lat., 20° 51′ E. long., on a bottom of sandy clay. It is nearly allied to Bonellia viridis.

A second new type of Bonellidæ is briefly described as follows:—

#### Saccosoma, g. n.

Body claviform. The anterior part cylindrical, opaque, with a round buccal aperture at the free extremity; the posterior part, containing the whole of the intestinal canal, is nearly spherical, transparent, terminating in an opaque cone, at the apex of which is the anus. Ovaries in the anterior part of the body-cavity. No hooks.

# Saccosoma vitreum, sp. n.

The anterior, cylindrical, opaque part of the body 12 millims. long; the posterior, transparent, globular portion 18 millims. long, 12-14 millims. broad. Colour of the anterior part of the body and of the conical termination white with a slight reddish tinge; the globular, transparent portion is colourless.

A single example, at Station 40, in 63° 22' 5 N. lat., 5° 29' W.

long., from sandy mud at 1215 fathoms.

Of the family Sipunculide the authors give short characters of the following new species:—

# Phascolosoma Lilljeborgii, sp. n.

Cylindrical, transparent. Body furnished with scattered fine papillæ; its breadth in proportion to its length as 1:20. Proboscis as long as the body, beset with exceedingly small acute papillæ. Tentacles eight to ten. One retractor.

Many examples, taken at three stations, from 63° 5′ to 71° 59′ N. lat., and between 14° 32′·7 and 0° 52′·5 E. long., at depths of

536, 587, and 1110 fathoms, on bottoms of mud and Biloculina-ooze.

Aspidosiphon armatum, sp. n.

Body cylindrical, 8 millims. long, covered with larger and smaller chitinous plates; posterior extremity obliquely truncated. Proboscis twice as long as the body, set all over with hooks, and furnished with from ten to twelve short tentacles. Terminal shield round, nearly flat, composed of chitinous plates, which are tongue-shaped in the margin, round in the centre. Besides the shield there are six rings beset with plates. The anterior shield reversed heart-shaped.

A single example, at Station 87, in 64° 2' N. lat., 5° 35' E. long.,

at a depth of 498 fathoms, on a muddy bottom.

# Onchnesoma glaciale, sp. n.

Body cylindrical, 35 millims. long, 2 millims. broad; its posterior extremity sparingly beset with extremely fine papille. Proboseis twice as long as the body; its anterior fourth furnished with nume-

rous regular rows of hooks. Skin transparent.

Numerous examples, at five stations ranging from 65° 53′ to 73° 47′·5 N. lat., and from 7° 18′ W. long. to 14° 21′ E. long. Chiefly on *Biloculina*-ooze, at depths of from 767 to 1163 fathoms; one specimen on blue clay at 634 fathoms (lat. 68° 65′ N., 9° 44′ E. long.).

Stephanostoma, g. n.

Buccal disk very broad, with ten large groups of tentacles, between which are seated some isolated tentacles. Anal aperture immediately behind the base of the proboscis.

# Stephanostoma Hansenii, sp. n.

Body cylindrical. Proboscis nearly as long as the body. Skin firm, coriaceous. Analorifice in a prominent papilla. Tentacles placed in ten groups, sixteen in each group, and between each two groups a pair of tentacles, making in all 180; four retractors; intestine forming a spiral. Spindle muscles. Colour—body olivegreen; proboscis lighter, with a rose-coloured neck; buccal disk nearly white, with ten red streaks; tentacles rose-coloured.

One whole example and many fragments obtained at Station 223, in 70° 54′ N. lat., and 8° 24′ W. long., at a depth of 70 fathoms, in black volcanic sand and mud; and a nearly perfect specimen at Station 267, in 71° 42′ N. lat., 37° 1′ E. long., at 148 fathoms, on

a bottom of mud and stones.

The authors further propose a new family under the name of

# EPITHETOSOMATIDÆ, Dan. & Koren.

Body furnished with a cylindrical hollow tube corresponding to the crop-cavity. Behind this, on each side of the anterior extremity of the body, is a fissure furnished with apertures at the bottom. No hook-bristles.

# EPITHETOSOMA, g. n.

Body cylindrical, furnished at its anterior end with a long, non-retractile, tubular appendage (proboscis). Behind this, on the ventral surface, the round buccal aperture. On each side of the anterior extremity of the body a fissure, which is furnished with several apertures at the bottom; no anal appendages; anus at the posterior extremity of the body.

# Epithetosoma norvegicum, sp. n.

Body cylindrical, 12 millims. long, 2 millims. broad. The tubular appendage two and a half times as long as the body; intestine the same, much folded. Colour of the body olive-green, of the proboscis pale greenish.

One example, taken at Station 190 in 69° 41′ N. lat., 15° 50′·5 E. long., at a depth of 870 fathoms, on a bottom of sandy mud.—Nyt

Magazin for Naturvid. 1880, pp. 44-66.

# On the Existence of Polar Globules in the Ovum of the Crustacea. By M. L. F. Henneguy.

Grobben is the only author who has hitherto noticed the presence of polar globules in the ovum of the Crustacea. He states that he saw, in the ovum of *Moina rectirostris*, a small clear spot situated at the superior pole, enclosed in the vitellus, which he regards as a polar globule flattened by the envelope of the ovum

which is closely applied to the vitellus.

On examining recently laid ova of Asellus aquaticus I saw, in the tolerably wide space which separates the vitellus from the chorion, two small transparent globules, containing a few granules and presenting all the characters of the polar globules observed in the ova of other animals. I have even been fortunate enough twice to see one of these globules detach itself from the vitellus. In all the ova that I have examined, these little bodies were nearly of the same diameter. In some ova there were four of them, forming a little group; and they were then smaller than in the ova in which there were only two: it is probable that in this case the two globules had divided.

These globules persist for some time in the ovum, and only disappear when the vitellus is already divided into about ten segments. The first segmentative grooves forming simultaneously around nuclei which make their appearance at the surface of the vitellus, the polar globules do not here play any part in relation to the production of the first segmentative furrow, and cannot be regarded as directive corpuscles. Their formation is very probably connected with the disappearance of the germinal vesicle, as Fol and Hertwig have demonstrated in the case of the Echinoderms; but the opacity of the vitellus has not allowed me to see the germinal vesicle, or to witness its disappearance.—Bull. Soc. Philom. Paris, April 10, 1880.